

Amendments to the Claims

This listing of claims will replace all prior versions and listings of claims in the application:

Listing of Claims

Claim 1 (Currently amended): A method ~~for cycling through addresses of testing a~~ memory device ~~for determining operating life with stressing~~, comprising:

~~generating for cycling through each address of the memory device by generating a~~ respective bit pattern comprised of a predetermined number of bits ~~for each address~~; and

~~applying stressing signals on a respective at least one cell of the memory device~~ corresponding to each generated address in the cycling;

~~performing the cycling and the applying of the stressing signals for a predetermined stress time period; and~~

~~minimizing charge gain failure in the memory device after the predetermined stress time period by cycling through the respective bit pattern for each of the addresses with a transition of less than the predetermined number of bits for sequencing to each subsequent address during the cycling.~~

Claim 2 (Previously Presented): The method of claim 1, further comprising:

cycling through the respective bit pattern for each of the addresses in a gray code sequence.

Claim 3 (Previously Presented): The method of claim 2, wherein the memory device is a flash memory device.

Claim 4 (Currently Amended): The method of claim 3, ~~further comprising:~~

~~eliminating charge gain failure of the flash memory device~~

wherein the stressing signals include a clock signal applied on a respective word line

corresponding to each generated address, and include a bit line voltage applied on a respective at least one bit line corresponding to each generated address.

Claim 5 (Currently Amended): The method of claim 2, further comprising:
generating a respective binary bit pattern for each of the addresses;
converting the respective binary bit pattern to a respective gray code bit pattern for each of the addresses; and
using the respective gray code bit pattern for the cycling by address decoders for accessing the memory device.

Claim 6 (Currently Amended): The method of claim 2, further comprising:
heating the memory device during the predetermined stress time period such that the step of cycling through the respective bit pattern for each of the addresses is performed during a test for HTOL (high temperature operating life) testing of the memory device.

Claim 7 (Previously Presented): The method of claim 1, further comprising:
cycling through the respective bit pattern for each of the addresses with a transition of a fixed number of bits for sequencing to each subsequent address.

Claim 8 (Previously Presented): The method of claim 1, wherein the memory device is a flash memory device.

Claim 9 (Currently Amended): The method of claim 8, further comprising:
eliminating charge gain failure of the flash memory device
wherein the stressing signals include a clock signal applied on a respective word line corresponding to each generated address, and include a bit line voltage applied on a respective at least one bit line corresponding to each generated address.

Claim 10 (Currently Amended): The method of claim 1, further comprising:

heating the memory device during the predetermined stress time period such that the step of cycling through the respective bit pattern for each of the addresses is performed during a test for HTOL (high temperature operating life) testing of the memory device.

Claim 11 (Currently Amended): A system for cycling through addresses of testing a memory device for determining operating life with stressing, comprising:

an address generator for generating for cycling through each address by generating a respective bit pattern comprised of a predetermined number of bits for each address; and

signal generators for generating stressing signals applied on a respective at least one cell of the memory device corresponding to each generated address in the cycling;

wherein the cycling and the applying of the stressing signals are performed for a predetermined stress time period; and

means for minimizing charge gain failure in the memory device after the predetermined stress time period cycling through the respective bit pattern for each of the addresses with a transition of less than the predetermined number of bits for sequencing to each subsequent address during the cycling.

Claim 12 (Previously Presented): The system of claim 11, further comprising:

a gray code converter for cycling through the respective bit pattern for each of the addresses in a gray code sequence.

Claim 13 (Previously Presented): The system of claim 12, wherein the memory device is a flash memory device.

Claim 14 (Currently Amended): The system of claim 13, wherein charge gain failure of the flash memory device is eliminated the signal generators include:

a clock signal generator for generating a clock signal applied on a respective word line corresponding to each generated address; and

a bit line voltage generator for generating a bit line voltage applied on a respective at

least one bit line corresponding to each generated address.

Claim 15 (Currently Amended): The system of claim 12, wherein the address generator generates a respective binary bit pattern for each of the addresses, and wherein the gray code converter converts the respective binary bit pattern to a respective gray code bit pattern for each of the addresses, and wherein the system further comprises:

address decoders for decoding the respective gray code bit pattern for determining the respective at least one memory cell to have the stressing signals applied thereon accessing the memory device.

Claim 16 (Currently Amended): The system of claim 12, further comprising:

a heater for heating the memory device during the predetermined stress time period such that cycling through the respective bit pattern for each of the addresses is performed during a test for HTOL (high temperature operating life) testing of the memory device.

Claim 17 (Currently Amended): The system of claim 11, further comprising:

mean means for cycling through the respective bit pattern for each of the addresses with a transition of a fixed number of bits for sequencing to each subsequent address.

Claim 18 (Previously Presented): The system of claim 11, wherein the memory device is a flash memory device.

Claim 19 (Currently Amended): The system of claim 18, wherein charge gain failure of the flash memory device is eliminated the signal generators include:

a clock signal generator for generating a clock signal applied on a respective word line corresponding to each generated address; and

a bit line voltage generator for generating a bit line voltage applied on a respective at least one bit line corresponding to each generated address.

Claim 20 (**Currently Amended**): The system of claim 11, further comprising:
a heater for heating the memory device during the predetermined stress time period such
~~that cycling through the respective bit pattern for each of the addresses is performed during a test~~
for HTOL (high temperature operating life) testing of the memory device.